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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/092,405	03/05/2002	Yoshiki Nishitani	393032027920	1352
7590	06/15/2004			
David L. Fehrman Morrison & Foerster LLP 35th Floor 555 W. 5th Street Los Angeles, CA 90013			EXAMINER WARREN, DAVID S	
			ART UNIT 2837	PAPER NUMBER
DATE MAILED: 06/15/2004				

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/092,405

Applicant(s)

NISHITANI ET AL.

Examiner

David S. Warren

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-5, 7-11, 13-20, 24 and 25 is/are pending in the application.
- 4a) Of the above claim(s) 25 is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-5, 7-11, 13 and 15-20 is/are allowed.
- 6) ☒ Claim(s) 14 and 24 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 05 March 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

**DETAILED ACTION**

The applicant filed a Status Request on April 16, 2004 stating the instant application was filed on March 5, 2002 and that "Applicants have not yet received an action from the Patent Office." The examiner notes that a non-final rejection was mailed on September 13, 2002, a second non-final rejection mailed May 22, 2003, a final rejection mailed October 31, 2003, and an advisory action mailed February 25, 2004 have been sent to the applicant with acknowledgements from the applicant.

Clarification is required.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 14 and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kashio et al. (5,350,881) in view of Okamoto et al. (JP 404093997 A). Regarding claims 14 and 24, Kashio discloses the use of a stick-shaped operation terminal (col. 1, lines 14 and 15) capable of transmitting data to a tone signal generation device (col. 1, lines 23 - 25) which is capable of being carried by a human operator, a detection section (i.e., the "tip" – col. 1, line 20) having a piezo-electric element (col. 1, line 19), a

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transmission section (col. 1, lines 23 – 25; i.e., sending signals from the tip to the loudspeakers). Kashio also discloses the use of a piezo-electrical element (albeit in the prior art; col. 1, line 19). However, Kashio does not teach the use of a strain gauge for sensing displacement. Okamoto discloses the use of a “strain gauge in the stick (1) that detects elastic deformation.” It would have been obvious to one of ordinary skill in the art to combine the teachings of Kashio and Okamoto to obtain a drumstick containing strain gauges. The motivation for making this combination is shown by Okamoto: “To enable performance with a bouncing sound by combining a performance operation element which deforms elastically” to assist with types of playing technique such as spiccato, staccato, etc.).

### ***Claim Rejections - 35 USC § 102***

Claims 14 and 24 are rejected under 35 U.S.C. 102(b) as being anticipated by Okamoto et al. (JP 404093997 A). Regarding claims 14 and 24, Okamoto discloses the use of a stick (1), a strain gauge within the stick (see “Constitution” and fig. 2 A), and a transmitting section (21) for transmitting data to a tone generator (19). The strain gauge of Okamoto will inherently “detect amount of displacement” which Okamoto discloses as “a strain gauge in the stick (1) detects elastic deformation.”

### ***Allowable Subject Matter***

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As stated in the previous Office Action, claims 1- 5, 7 – 11, 13, and 15 – 20 are allowed. Claims 1 – 5, 7 – 11, 13, and 15 – 20 are allowed. The prior art does not show any teachings where tones are generated in accordance with detecting the shape (or “detected movement trajectory”) of a movement, e.g., spiral, circular, rectangular, etc. Regarding claims 10, 16, and 20, the prior art does not show a deformable “operation terminal” that signals a tone generator using deformation displacement and a data table, wherein the data table is selectable and prepared in advance in accordance with different contact surface material.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Regarding the §103 rejection above, the examiner would like to direct the Applicant's attention the references of Prince, McClish, and Yamauchi which all show substituting piezo-elements with strain gauges; see Prince (5,581,484; col. 5, lines 10 - 13), McClish (5,218,159; see abstract, line 14), and Yamauchi (5,117,730; col. 16, first paragraph).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to David S. Warren whose telephone number is 571-272-2076. The examiner can normally be reached on M-F, 9:30 A.M. to 6:30 P.M..


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Martin can be reached on 571-272-2800 ext 37. The fax phone

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number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

dsw



MARLON T. FLETCHER  
PRIMARY EXAMINER